REMARKS

Favorable reconsideration is respectfully requested.

The claims are 1-15.

Claims 1-10 have been rejected under 35 U.S.C. 103(a) over Sato et al. (U.S. 6,042,988) in view of JP 2-15270 on the ground that Sato et al. teaches a negative-working photoresist composition comprising the essential ingredients in the composition of claim 1, while recognizing that Sato does not teach the specific crosslinking agent defined as component (C) in claim 1. The rejection appears to take a position that this deficiency of Sato can be remedied by the disclosure in the JP '270 reference.

In reply, it is recognized that the ethyleneurea compounds expressed by the structural formulas at the top of the upper right column on page 954 of the reference each meet the definition of component (C) of claim 1.

However, the characteristic feature of the present invention consists of the unique combination of a specific component (B) and a specific component (C). This unique feature of the present invention can never be obvious over a combination of Sato and JP references without the benefit of an improper hindsight reconstruction of the present invention with the benefit of the Applicants' own disclosure in this application.

As pointed out by the rejection, Sato teaches an onium salt compound as a PAG which is allegedly the same as or similar to the compound as component (B) in claim 1 but is absolutely silent on the specific crosslinking agent as component (C) in claim 1. The crosslinking agent in Sato is exemplified by those compounds in claim 15, none of which meets the definition of component (C) in claim 1. The JP reference, on the other hand, teaches some ethyleneurea compounds as crosslinking agents, but is silent on the specific onium salt compounds as the PAG compound.

The JP reference teaches iodonium salt compounds and sulfonium salt compounds as the PAG compound. See formulas (VII) and (VIII) on the lower left column of page 954. The anionic moiety represented by X^- in these formulas is limited to BF_5^-, PF_6^-, AsF_6^-, SbF_5^- and ClF_4^-

anions including none of the fluoroalkyl sulfonate anions required in claim 1. See page 955, upper left column, lines 5-7.

The advantages obtained by using the unique combination of the specific component (B) and specific component (C) are clearly demonstrated in the Examples as compared with Comparative Examples and are entirely unobvious over Sato in view of the JP reference.

Further, claims 11-15 are rejected under 35 U.S.C. 103(a) over Sato in view of JP '270 and further in view of Rogers. The Sato and JP references are discussed above in connection with the rejection of clam 1-10. While the rejection takes the position that the combination of Sato and the JP references teaches the photoresist composition used as the material of layer (C) in claim 11, such position is based on hindsight, as discussed above.

The rejection further contends that, although Sato does not teach a BARC and a TARC (Claim 15), this deficiency of Sato can be remedied by Rogers which teaches a BARC and a TARC in the paragraph bridging columns 2 and 3. In reply, it is pointed out that Rogers is silent on the solubility behavior required for the BARC and TARC materials excepting a mention that "examples of BARC materials, such as organic BARC, will be apparent to those of ordinary skill" without making reference to any prior art documents. In contrast, the BARC and TARC layers herein are required to be water-insoluble (claim 11) and water-soluble (claim 15), respectively.

In connection with the types of the photoresist composition, furthermore, it is the requirement in claim 11 that the photoresist composition is negative-working (see claim 1) while Rogers recommends positive tone I-line resists (column 3, line 4).

In addition, Rogers teaches that the TARC layer has a thickness of 64 nm (column 3, line 21) while the TARC layer in the present invention has a thickness of 35-45nm (claim 15).

In sum, with so many unique features of the claimed subject matter unobvious over Sato in view of the secondary references, no one skilled in the art could be motivated to formulate the photosensitive material of the claims 11-15 without the benefit of the disclosure in this application.

For the foregoing reasons, it is apparent that the rejections on prior art are untenable and should be withdrawn.

An Information Disclosure Statement accompanies.

No further issues remaining, allowance of this application is respectfully requested.

If the Examiner has any comments or proposals for expediting prosecution, please contact undersigned at the telephone number below.

Respectfully submitted,

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